

REMARKS

Claims 1-12 and 14 are pending in this application. Applicants request that these claims be reexamined in light of the amendments made herein, which put them in condition for allowance.

Applicants thank Examiner Helmer for the telephonic interview that was held on July 15, 2004, to discuss the enablement rejection.

On page 3 of the Office Action mailed April 20, 2004, the Office maintained the rejection of claim 10 under 35 U.S.C. § 112, second paragraph. Applicants have amended claim 10 according to the Office's suggestion, by including the language "in which the herbicide resistance DNA encodes *bar* resistance or glyphosphate resistance." Therefore, Applicants respectfully request that the rejection be withdrawn.

On pages 3-5 of the Office Action, the Office maintained the rejection of claims 1-12 and 14 under 35 U.S.C. § 112, second paragraph, for an asserted lack of enablement. The Office argued that "Agrobacterium-mediated transformation of monocots is particularly unpredictable," Office Action of April 20, 2004, at 4, and therefore required that more details of the method be included in the claims. Applicants have amended the steps of claim 1 to recite:

"(a) transforming embryo cells of the *Allium* genus plant with DNA sequences via a vector or direct gene transfer to produce transformed plant material, wherein transformation is achieved by:

- (i) transferring embryo tissue into a preparation of *Agrobacterium*,
- (ii) transferring the embryos to a culture medium;
- (iii) co-cultivating for a period of 1-12 days;

(b) selecting the transformed plant material, by transferring the embryos to a selection medium containing the appropriate selection agents to kill the agrobacteria and preferentially grow the transgenic plant cells;

(c) culturing the tissues from (b) to produce secondary embryos and regenerating the transformed plant material; and

(d) obtaining a transformed *Allium* genus plant;

wherein the method of transforming is carried out without a passage through a callus phase.”

Similarly, merely to further prosecution, the steps of claim 7 have been amended to recite:

“(a) isolating immature embryos of the *Allium* genus plant to be transformed;

(b) transforming the immature embryos by inoculating the immature embryos with an *Agrobacterium* strain and wounding the immature embryos in a culture medium, wherein transformation is achieved by:

(i) transferring embryo tissue into a preparation of *Agrobacterium*,

(ii) transferring the embryos to solid medium, and

(iii) co-cultivating for 1-12 days;

(c) transferring the immature embryos to a selective medium of P5 medium plus 10 mg/l geneticin and 200 mg/l timentin or 5 mg/l Basta and 200 mg/l timentin, or other appropriate selective agents to kill the agrobacteria and preferentially select the transgenic *Allium* cells;

(d) culturing the immature embryos in the dark to produce secondary embryos;

- (e) selecting putative transgenic cultures;
- (f) regenerating plants; and
- (g) producing a transformed *Allium* genus plant.”

Applicants respectfully submit that these additional claim terms provide the details that one of skill in the art would need to carry out the claimed methods. Other features of the method described on pages 5 and 6 of the specification would be known to one of skill in the art, as indicated by the citations to Eady, C.C., et al., *Plant Cell Reports*, vol. 18, pp. 111-116 (1998), Eady, C.C. and Lister, C.E., *Plant Cell Reports*, vol. 18, pp. 117-121 (1998), and Murashige, T. and Skoog, F., *Physiol. Plant*, vol. 40, pp. 499-506 (1962).

In light of the amendments to independent claims 1 and 7, Applicants respectfully request that the rejection under 35 U.S.C. § 112, first paragraph, for lack of enablement be withdrawn. Furthermore, Applicants respectfully request reconsideration and reexamination of this application and the timely allowance of the pending claims.

Please grant any extensions of time required to enter this response and charge any additional required fees to our deposit account 06-0916.

Respectfully submitted,

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GARRETT & DUNNER, L.L.P.

Dated: September 9, 2004

By: _____



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